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56 | Confocal microscopic features of scarring alopecia: preliminary report

M. Agozzino, A. Tosti, L. Barbieri, E. Moscarella, C. Cota, E. Berardesca and M. Ardigo; BJD British Association of Dermatologists 2011, pp534?540 DOI 10.1111/j.1365-2133.2011.10424.x*

ABSTRACT

Background: Lichen planopilaris (LPP) and discoid lupus erythematosus (DLE) are the most common causes of lymphocytic primary cicatricial alopecia. The management of scarring alopecia can be difficult. The combination of clinical, dermoscopy and reflectance confocal microscopy (RCM), a noninvasive, highresolution imaging technique, examinations have already been demonstrated to be useful for choosing the correct biopsy site in patients with inflammatory skin disease and obtaining microscopic diagnostic criteria.

Objectives: We evaluated the usefulness in practice of RCM for the identification of criteria for LPP and DLE involving the scalp and their management during therapeutic follow-up. Methods Seven white patients with a previously established histological diagnosis of DLE (three) and LPP (four), were included in the study. RCM criteria for primary scarring alopecia were selected: epidermal disarray, spongiosis, exocytosis of inflammatory cells in the epidermis, interface dermatitis, peri- and intra-adnexal infiltration of inflammatory cells, dilated vessels in the dermis, dermal infiltration of inflammatory cells and melanophages and dermal sclerosis. All patients were followed up using RCM during the treatment. During follow-up the RCM evolution of the epidermal, junctional and dermal inflammation were evaluated. Results A series of RCM features of scalp LPP and DLE were identified that show correlation with the histopathological evaluation. During the treatment follow-up of the cases RCM was shown to be sensitive for the identification of therapeutic response.

Conclusion: In our preliminary study the effective usefulness of RCM for the diagnosis of scarring alopecia and follow-up seemed to be evident. Moreover, RCM seems to be also promising for differential diagnosis between the different entities.